

Amendments to the Claims:

This listing of claims replaces all prior versions and listings of claims in the application:

Listing of Claims:

1. (Currently Amended) A method of streaming data units to terminals, the method comprising:
 - using a duplicating switch to receive communications;
 - using the duplicating switch to selectively filter the communications;
 - using the duplicating switch to receive a first stream of data units that are addressed to a unicast address on the duplicating switch, wherein the first stream of data units includes a payload portion and an attribute portion;
 - using the duplicating switch to store content from the first stream;
 - using the duplicating switch to generate second streams that incorporate the stored content for use by two or more terminals having addressing information that was not part of the first stream; and
 - ~~using the duplicating switch to make the second streams available to the terminals,~~
 - ~~wherein the duplicating switch is configured to duplicate one or more portions of the first stream~~
 - in response to a request, using the duplicating switch to forward a duplicated payload portion of the data unit within the second streams of data units addressed to a unicast address on each of the two or more terminals,
 - wherein the duplicating switch is structured and arranged to selectively filter the communications and forward the duplicated portion in response to examining an address.
2. (Original) The method of claim 1 wherein using the duplicating switch to store content includes storing content that is temporally related to the data units that are being generated.

3. (Original) The method of claim 1 further comprising using a location identifier to indicate which portion of content is being generated into the second streams.

4. (Original) The method of claim 3 further comprising using location identifiers to access the content time-shifted as two different streams.

5. (Original) The method of claim 1 wherein using the duplicating switch to store content includes storing more than one instance of the same portion of content.

6. (Original) The method of claim 5 wherein using the duplicating switch to store content includes storing additional instances of the stream as demand for the content increases.

7. (Original) The method of claim 1 wherein using the duplicating switch to store content includes storing content and associated header information.

8. (Original) The method of claim 1 wherein using the duplicating switch to store content includes storing a checksum describing the content.

9. (Original) The method of claim 1 wherein at least one of the second streams is transmitted in response to receiving a request from a terminal.

10. (Original) The method of claim 1 wherein the second stream is transmitted in response to receiving a request from a service provider.

11. (Original) The method of claim 1 wherein:
storing the content includes using location identifiers to track simultaneous transmissions of a single stored instance of a stream, and

transmitting includes transmitting the different data units within the single stored instance to several requestors who have terminals receiving the stream that overlap but differ by a time differential.

12. (Original) The method of claim 1 wherein the duplicating switch is a specialized device including hardware configured to perform one or more of receiving a first stream of data units, storing content from the first stream, generating second streams, and making the second streams available.

13. (Currently Amended) A duplicating switch comprising:

means for using a duplicating switch to receive communications;

means for using the duplicating switch to selectively filter the communications;

means for receiving a first stream of data units that are addressed to a unicast address on the duplicating switch, wherein the first stream of data units includes a payload portion and an attribute portion;

means for storing content from the first stream;

generating means for generating second streams that incorporate the stored content for use by two or more terminals having addressing information that was not part of the first stream, the generating means being configured to duplicate one or more portions of the first stream; and

means for making the second streams available to the terminals

means for using the duplicating switch to forward the duplicated payload portion of the data unit within the second streams of data units addressed to a unicast address on each of the two or more terminals in response to a request,

wherein the duplicating switch is structured and arranged to selectively filter the communications and forward the duplicated portion in response to examining an address.

14. (Original) The duplicating switch of claim 13 wherein means for storing content includes means for storing content that is temporally related to the data units that are being generated.

15. (Original) The duplicating switch of claim 14 further comprising means for using a location identifier to indicate which portion of content is being generated into the second streams.

16. (Original) The duplicating switch of claim 15 further comprising means for using location identifiers to access the content time-shifted as two different streams.

17. (Original) The duplicating switch of claim 13 wherein means for storing content includes means for storing more than one instance of the same portion of content.

18. (Original) The duplicating switch of claim 17 wherein means for storing content includes means for storing additional instances of the stream as demand for the content increases.

19. (Original) The duplicating switch of claim 13 wherein means for storing content includes means for storing content and associated header information.

20. (Original) The duplicating switch of claim 13 wherein means for storing content includes means for storing a checksum describing the content.

21. (Original) The duplicating switch of claim 13 wherein the means for making the second streams available include means for transmitting at least one of the second streams in response to receiving a request from a terminal.

22. (Original) The duplicating switch of claim 13 wherein the second stream is transmitted by the means for making it available in response to receiving a request from a service provider.

23. (Original) The duplicating switch of claim 13 wherein:
means for storing the content includes means for using location identifiers to track simultaneous transmissions of a single stored instance of a stream, and
means for transmitting includes means for transmitting the different data units within the single stored instance to several requestors who have terminals receiving the stream that overlap but differ by a time differential.

24. (Original) The duplicating switch of claim 13 wherein the generating means include a specialized device including hardware configured to perform one or more of receiving a first stream of data units, storing content from the first stream, generating second streams, and making the second streams available.

25. (Currently Amended) A duplicating switch comprising:
a first communications interface structured and arranged to:
receive communications,
selectively filter the communications, and
receive a first stream of data units that are addressed to a unicast address on the duplicating switch, wherein each data unit includes a payload portion and an attribute portion;
a storage processor structured and arranged to store content from the first stream;
a switching processor structured and arranged to generate second streams that incorporate the stored content for use by two or more terminals having addressing information that was not part of the first stream, the switching processor being configured to duplicate one or more portions of the first stream; and

a second communications interface structured and arranged to ~~make the second streams~~
~~available to the terminals~~

forward the duplicated payload portion of the data unit within the second streams of data
units addressed to a unicast address on each of the two or more terminals in response to a
request,

wherein the duplicating switch is structured and arranged to selectively filter the
communications and forward the duplicated payload portion in response to examining an
address.

26. (Original) The duplicating switch of claim 25 wherein the storage processor is structured and arranged to store content that is temporally related to the data units that are being generated.

27. (Original) The duplicating switch of claim 26 further comprising a first memory processor structured and arranged to use a location identifier to indicate which portion of content is being generated into the second streams.

28. (Original) The duplicating switch of claim 27 further comprising a second memory processor structured and arranged to use location identifiers to access the content time-shifted as two different streams.

29. (Original) The duplicating switch of claim 25 wherein storage processor is structured and arranged to store more than one instance of the same portion of content.

30. (Original) The duplicating switch of claim 29 wherein the storage processor is structured and arranged to store additional instances of the stream as demand for the content increases.

31. (Original) The duplicating switch of claim 25 wherein the storage processor is structured and arranged to store content and associated header information.

32. (Original) The duplicating switch of claim 31 wherein the storage processor is structured and arranged to store a checksum describing the content.

33. (Original) The duplicating switch of claim 25 wherein the second communications interface is structured and arranged to make at least one of the second streams available in response to receiving a request from a terminal.

34. (Original) The duplicating switch of claim 25 wherein the second stream is transmitted by the second communications interface in response to receiving a request from a service provider.

35. (Original) The duplicating switch of claim 25 wherein:
the storage processor is structured and arranged to use location identifiers to track simultaneous transmissions of a single stored instance of a stream, and
the second communications interface is structured and arranged to transmit the different data units within the single stored instance to several requestors who have terminals receiving the stream that overlap but differ by a time differential.

36. (Original) The duplicating switch of claim 25 wherein the switching processor is a specialized device including hardware configured to perform one or more of receiving a first stream of data units, storing content from the first stream, generating second streams, and making the second streams available.